VOVK, Aleksey Anufrieyvich, kand. tekhn. nauk; KOCHERGA, Nikolay Timofeyevich, inzh.; CHERNYY, Geliy Ivanovich, kand. tekhn. nauk; BEBENIN, M.Ye., inzh., retsenzent

[Development of ore deposits in the Ukraine at great depths] Razrabotka rudnykh mestorozhdenii Ukrainy na bol'shikh glubinakh. Kiev, Tekhnika, 1964. 267 p. (MIRA 18:2)

VOVK, Aleksey Anufrieyvich; CHERNYY, Geliy Ivanovich; NOVOZHILOV, M.G., prof., doktor tekhn. nauk, retsenzent; FILATOVA, T.A., red.

[Mining mineral deposits by the combined method] Razrabotka mestorozhdenii poleznykh iskopaemykh kombinirovannym sposobom. Kiev, Naukova dumka, 1965. 189 p. (MIRA 18:3)

S/020/62/143/004/019/027
B106/B138

15.8100

AUTHORS: Topchiyev, A. V., Academician, Chernyy, G. I., and Andronov, V. N.

TITLE: Polymerization of allyl benzene in the presence of a catalytic system of the Ziegler type

PERIODICAL: Akademiya nauk SSSR. Doklady, v. 143, no. 4, 1962, 879-882

TEXT: Allyl benzene was polymerized by means of a catalytic system of titanium tetrachloride and triisobutyl aluminum. Some properties of the resulting polymers were investigated, since polyallyl benzene is interesting as the second link of the homologous series polystyrene, polyallyl benzene, poly-4-phenyl butene-1, poly-5-phenyl pentene-1. Allyl benzene was polymerized in dry nitrogen atmosphere with different ratios of the catalyst components (triisobutyl aluminum: titanium tetrachloride from 3:1 to 1:3), different temperatures (20°C, 70°C), and different reaction times (0-7 hr). The solvent was dry n-heptane. Both at 20 and 70°C, the optimum ratio of the two catalyst components was

Card 1/4

1:1. At this ratio, the polymer yield was 12.0% (20°C) and 38.2% (70°C). 90% of this maximum yield was reached after 3 hr reaction. The yield changed very little with longer reaction times (measurements at 70°C). Polyallyl benzene is a white powder (softening temperature 192-210°C) insoluble in organic solvents at room temperature. At 130-150°C, it dissolves in decalin, tetralin, α-bromo naphthalene, and cyclohexanone. Polymerization at 70°C and a triisobutyl aluminum/titanium tetrachloride ratio of 1:3 yielded a lower polymer (m. 77-107°C) soluble in benzene at room temperature. The mean specific gravity of polyallyl benzene is 1.055. The polymer is amorphous, but some ordering occurs when recrystallized from decalin and toluene. Analysis of the infrared spectra of polyallyl benzene shows that the chains ar of the"head-to-tail" type. The characteristic viscosity of the crude polymer at 150°C ranges from 0.238 (in α-bromo naphthalene) to 0.340 (in decalin). By fractional extraction with acetone, ether, and finally benzene, the higher as well as the lower polymers mentioned were decomposed into fractions of different molecular weights (Tables 1,2). For the

Polymerization of allyl benzene in the ...

Mark-Kuhn-Houvink equation (Ref. 13: H. Mark, Der feste Körper, Leipzig, 1938; R. Houvink, J. pract. Chem., 157, 15 (1940); Roundy (Ed.), Styrene, Its Polymers, Copolymers and Derivatives, N. Y. no. 4, 1952, p. 356) the following was found using the data in Table 1: $[\eta] = 3.41 \cdot 10^{-6} M^{0.977}$. The molecular weights in Table 2 were calculated from this equation. Besides the solid polymers described liquid products were obtained which are viscous to varying degrees, opalescent, yellow to browny-orange in color, and have characteristic odor; they had wide ranges of yields and molecular weights (molecular weights 200-800). They have lubricating properties. The high-molecular, solid polyallyl benzene can be processed into foils and fibers with valuable physical and chemical properties (Ref. 5: W. N. Bakter, US pat., 2842531, 8 VII, 1958). There are 2 figures and 2 tables. The four most important English-language references are: T. W. Campbell, A. C. Haven, J. Appl. Polym. Sci., 1, no. 1, 73 (1959); E. Hunter, W. G. Oakes, Trans. Farad. Soc., 41, no. 277, 49 (1945); J. Kirhwood, J. Riseman, J. Chem. Phys., 16, 565 (1948); P. Debye, A. Bueche, J. Chem. Phys., 16, 573 (1948).

Card 3/5

Polymerization of allyl benzene in the ...

ASSOCIATION: Institut neftekhimicheskogo sinteza Akademii nauk SSSR (Institute of Petrochemical Synthesis of the Academy of Sciences USSR)

SUBMITTED: December 27, 1961

Table 1. Results of fractionation of low-melting polyallyl benzene.
Table 2. Results of fractionation of a mixture of 24 polyallyl benzene samples. Legend to both tables: (A) Fraction; (B) fractionation time, hr; (C) fraction obtained, g; (D) amount of the fraction in the polymer, %; (E) softening temperature, °C; (F) characteristic viscosity; (G) molecular weight; (H) in acetone; (I) in ether; (K) in benzene; (L) residue. The characteristic viscosity was measured in benzene at 50°C. The molecular weights of Table 1 were determined by measurements of light dispersion in benzene at 20°C (fractions 1 and 2), and at 25°C (fraction 3).

Card 4/5

CHERNYY, G.I.; SPEKTOR, M.A.

Weighing and recording of bulk loads on belt conveyers (from "Svensk bergs och brukstidning," no.11, 1959, no.1, 1960). Ugol' Ukr. 5 no.5:43-44 My '61. (MIRA 14:5)
(Sweden--Coal mining machinery)

KORENNOV, B.I.; CHERNYY, G.M.

Laboratory investigations of the dispersion of dielectric permeability of rock samples. Geol. i geofiz. no.11:108-114 '62. (MIRA 16:3)

1. Institut merzlotovedeniya Sibirskogo otdeleniya AN SSSR, Yakutsk.
(Rocks—Electric properties)

CHERNYY, G.S., inzhener.

State standards. Nauka i zhizn' 22 no.10:62-64 O '55. (MLRA 9:1)
(Standardization)

20396

S/182/61/000/005/006/006
D038/D112

1.1100 2908

AUTHORS: Chernyy, G.S., Danilin, I.N.

TITLE: Machining large parts of hydraulic presses

PERIODICAL: Kuznechno-shtampovochnoye proizvodstvo, no. 5, 1961, 42-45

TEXT: The article deals with special equipment and methods used at the NKMZ Plant. They are the result of years of systematic development. Rough milling was chosen on account of its high cutting rate. Large 350-700 mm diameter milling heads with 40 x 40 mm carbide-tipped cutting inserts were used. The heads are set directly on the spindle of machine tools (boring or milling). The same heads with a spindle cutter are used in finish milling. Special highly productive heads (Fig. 1) can work 2000 mm wide surfaces. This head serves, at the same time as the machine face plate. Its diameter is 2250 mm; forty-eight 40 x 40 mm cutters are tipped with T 5K10 (T5K10) alloy. These heads remove up to 20 mm allowance in a single pass. The new method is from 5 to 7 times faster than usual milling. Single-tooth finishing milling heads (Fig. 2) have one wide cutter and operate with low cutting depth (0.05-0.2 mm) and high feeds (2-3 mm rev) at 200-350 m/min speed. The cutter setting is simple, cutting needs no high effort, and

Card 1/8

20396

S/182/61/000/005/006/006

Machining large parts of hydraulic presses D038/D112

causes no considerable increase in temperature; the surface finish is up to class 7 (▽7), and machining of unique parts is possible on vertical boring machines, which is very important in view of the small size of today's milling and shaping machines. Boring machines are used for semi-finish and finish machining of planes up to 1100 mm in width and 7250 mm in length in a single pass. The wide cutter is fixed in a special holder placed on the planetary rest of the machine. These planes are milled with 0.15-0.2 mm cutting depth; 2-2.5 mm/ rev feed at 40-45 rpm. Multicutter heads are advantageous in rough cutting only (since the accuracy is determined by only one protruding cutter). Spherical surfaces of heavy parts are machined with single-cutter mills, with rotation of the machine table and milling head. The rotation axes of the blank and the milling head cross each other to produce a spherical surface. Semi-finish cutting is done by two cutters (four for 400 mm diameter spheres), and finish cutting by one only. The finish cutter is ground with a 3 mm radius at the tip and is carefully lapped on the front and rear face. This method is from 3.5 to 4 times more productive than usual methods, as it does away with fitting in assembly. Spheres of 3200 diam. were machined. Large bores up to 350 mm diam., and up to 3000 mm in length in solid metal are produced by annular drilling on horizontal boring machines. A comparatively simple and handy drilling head

Card 2/8

was made from a thick wall pipe (Fig. 3). To fix the head in the spindle, a shank (4) is screwed on it. A rotary receiver (5) is provided for liquid coolant. Cutters (1) are inserted into the body on cast iron guide blocks (2). Bores 3000 mm in length are worked from both sides. Spin forging is used extensively. Bore surfaces are oiled and rolled over with rollers which are held in special holders on the machine tool post. A special stand (Fig. 4) is used for machining the outline of large flat parts; 3800 wide and 16500 mm long parts were machined on it. An obsolete long boring machine with 50 m long guides was used for a stand. Two boring heads with a 175 mm spindle diameter, from the Leningradskiy zavod im. Sverdlova (Leningrad Plant im. Sverdlov) are used on the stand. Vertical plates are machined on two stands (Fig. 5) with a 3400 x 40,000 mm floor made up of bolted and concreted 2100 x 5000 mm cast iron plates. Two boring machines move along 45 m long guide ways from each side of the stand. Each machine can travel a distance of 35 m. Two parts can be installed and fastened on devices assembled on the plate floor. There is a stand (Fig. 7) for vertical boring in the assembled press frames. A vertical boring head for this operation is shown separately (Fig. 6). There are 7 figures.

Card 3/8

20396

S/182/61/000/005/006/006
D038/D112

Machining large parts of hydraulic presses

Fig. 1. 2250 mm diam. milling head

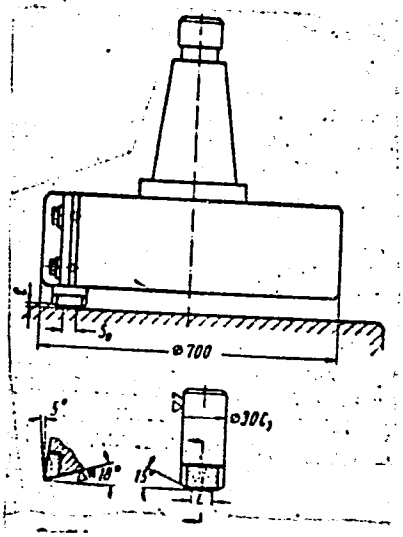


Fig. 2. Single-tooth finishing milling head

Card 4/8

...shining large parts of hydraulic presses

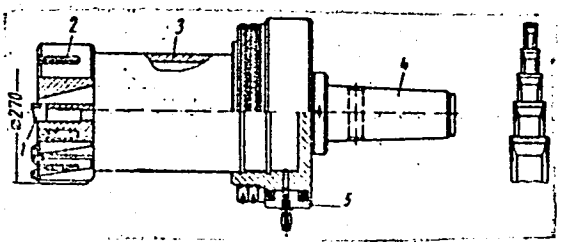


Fig. 3. Annular boring head
Card 5/8

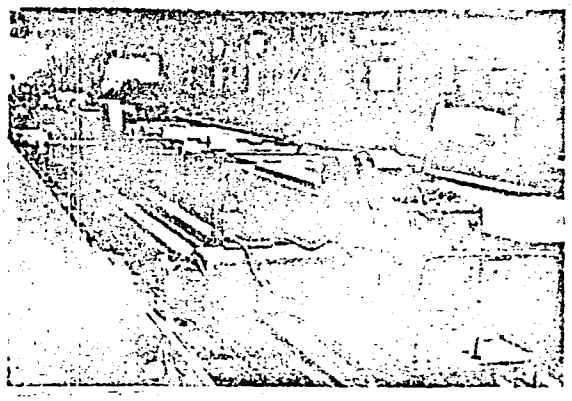


Fig. 4. General view of the special stand with boring heads

20396

S/182/61/000/005/006/006
D038/D112

Machining large parts of hydraulic presses

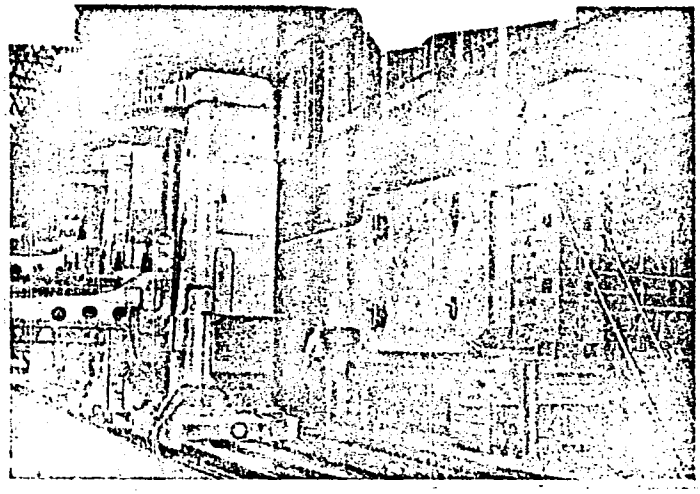


Fig. 5. Stand for machining vertical plates

Card 6/8

Machining large parts of hydraulic presses

S/182/61/000/005/006/006
D038/D112

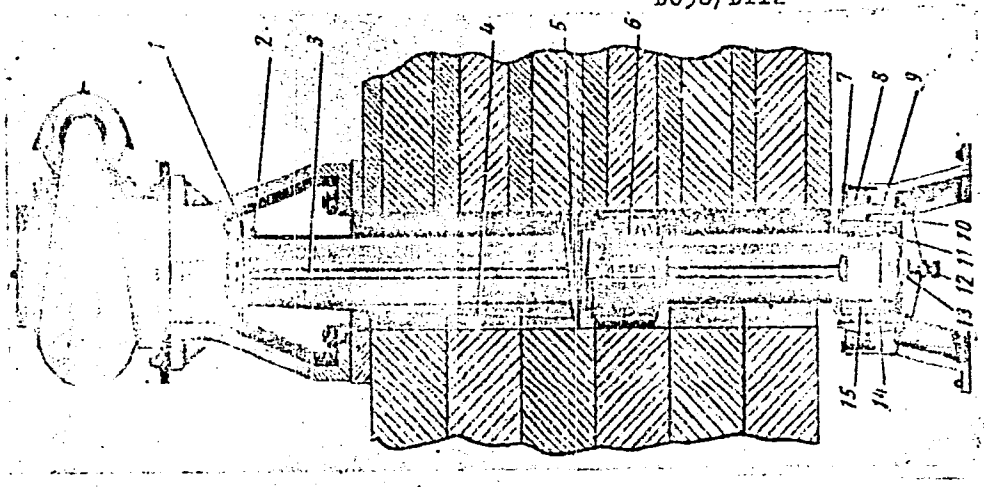


Fig. 6. Vertical boring head with boring bar: 1 - control wheel; 2 - micrometer; 3 - radial feed shaft; 4 - tension strip; 5 - measuring ring; 6 - coupling; 7 and 8 - covers; 9 - spherical bush; 10 - differential nut; 11 - spline; 12 - governing screw; 13 - block; 14 - bearing; 15 - bushing.

Card 7/8

20396

Machining large parts of hydraulic presses

S/182/61/000/005/006/006
D038/D112

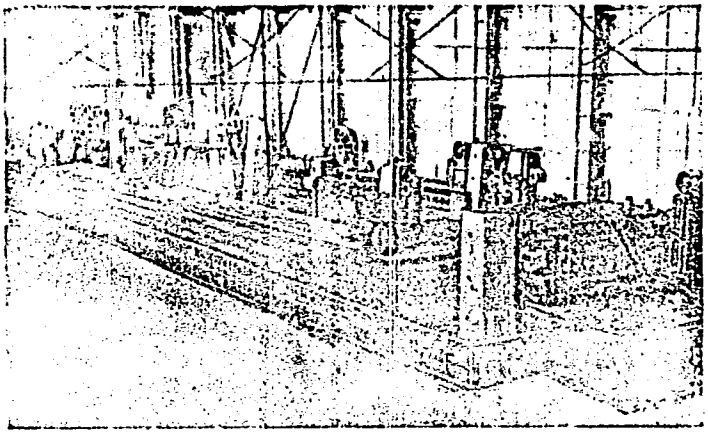


Fig. 7. Stand for boring assembled press frame

Card 8/8

CHERNYY, G.S.; DANILIN, I.N.

Machining of large-size hydraulic press parts. Kuz. shtam. proizv. 3 no. 5:42-45 My '61. (MIRA 14:5)
(Hydraulic presses) (Metal cutting)

CHERNYY, G.S., [illegible]

Classificational structure of the part nomenclature at a machinery plant. Mashinostroenie no.3:106-107 My-Je '65. (MIRA 18:6)

Chernyy, G.V.

135-58-4-4/19

AUTHORS: Chernyy, G.V., Garnazhenko, I.O., and Argunov, A.A.

TITLE: The "USL-1" Device for the Welding of Mine-Car Bodies (Ustanovka "USL-1" dlya svarki kazovov vagonetok)

PERIODICAL: Svarochnoye Proizvodstvo, 1958, Nr 4, pp 13-14 (USSR)

ABSTRACT: The article contains a detailed description, illustrated by schematic drawings, and a photograph of a new device, type "USL-1", for the assembly and automatic welding of mine-car side sheets. The device was designed at the Toretskiy mashinostroitel'nyy zavod (The Torets Machine-Building Plant) and can process 80 to 100 sheets with 200 m of total seam per shift.
There are 2 figures and 1 photograph.

ASSOCIATION: Toretskiy mashinostroitel'nyy zavod (Torets Machine-Building Plant)

AVAILABLE: Library of Congress

Card 1/1

CHERNYY, G.V.; GARNAZHENKO, I.O.; ARGUNOV, A.A.

USL-1 equipment for welding mine railroad cars. Svar. proizv. no.4: 13-14 Ap '58. (MIRA 11:4)

1. Toretskiy mashinostroitel'nyy zavod.
(Mine railroads--Cars--Welding)
(Electric welding--Equipment and supplies)

CHERNYY, G.V.

Automatic machine for the manufacture of center cores. Lit. proizv. no.11:36-37 N '60. (MIRA 13:12)
(Coremaking)

CHERNYY, I.; YANKOVSKIY, L.

Model and full-scale testing of 300 hp. water-jet propellers. Mech.transp. 19 no.7:23-25 Jl '60. (MIRA 13:8)

(Propellers--Testing)

KORZHINEK, F.; CHERNYY, I.

Use of motorbus trailers in Czechoslovakia. Avt.transp. 38 no.11:55-57 N '60. (MIRA 13:11)
(Czechoslovakia--Motorbus trailers)

CHERNYY, I., inzh.

New building materials at White Russian construction projects.
Zhil stroi. no.7:33-34 Jl '61. (MIRA 14:8)
(White Russia--Building materials industry)

CHERNYY, I.A.

The present status of narrow-film cinematography and the choice of the film format. Zhur.nauch. i prikl. fot. i kin. 1 no.2:127-132 Mr-Ap'56. (MLRA 9:10)
(Cinematography--Films)

CHERNYY, I.A.

Determination and designation of the photographic properties of flash bbulbs. Zhur.nauch.i prikl.fot.i kin. 1 no.5:373-375 S-O '56. (MLRA 9:11)

(Photography, Flashlight)

CHERNYY, I.A.

"High-speed cinematography in science and technology; collection of articles." Reviewed by I.A. Chernyi. Zhur. nauch. i prikl. fot. i kin. 1 no.6:476 N-D '56. (MLRA 10:2)

(Photography, Instantaneous)
(Cinematography)

977

778.32 : 523

The Instantaneous Photography of Celestial Objects. I. A. CHERNYI. *Zh. nauch. prikl. Fotogr. Kinematogr.*, Jan.-Feb. 1957, 2 [illegible] p.

[illegible] possibility of instantaneous photography of stars and planets [illegible] circumstances in which the motion of these bodies can [illegible] Equations are derived for the illumination of the image [illegible] (for a small planet), and (b) an extended [illegible] expressions of the actual illumination at the [illegible] for the Moon, and for Venus, Jupiter and Mars. It is [illegible] obtain an image of the Pole Star with a lens of focal length [illegible] and with an exposure of 1/100 s a material [illegible] GOST (Russian Standard) units is required [illegible] Under the same conditions Jupiter, when [illegible] would require a material with a sensitivity of 130 GOST units. Reducing the focal length to 3 m leaves the required sensitivity [illegible] surfaces it to about 11 GOST units for Jupiter. The [illegible] Moon are 80 and 4 GOST units respectively. [illegible] material is not necessary, most circumstances [illegible] material with a sufficiently high general [illegible] appropriate filters.

State optics Inst in S. I. Vavilov.

CHERNYY, I.

Motion-picture cameras for amateurs. Opt.-mekh.prom. 25 no.1:11-16 Ja '58. (MIRA 11:7)

(Motion-picture cameras)

BOGOSLOVSKIY, M.; CHERNYY, I.

Science and technology abroad. Opt.-mekh.prom. [25] no.3:56 Mr '58.
(MIRA 11:9)
(Optical instruments)

CHERNYY, I.A., red.; KUZNETSOVA, M.I., red. izd-va; MATVEYEVA, A.Ye., tekhn. red.

[Instructions 273-58 for checking sensitometers] Instruktsiia 273-58 po poverke sensitometrov. Izd. ofitsial'noe. Moskva, 1958. 18 p. (MIRA 14:5)

1. Russia(1923- U.S.S.R.) Komitet standartov, mer i izmeritel'nykh priborov.
(Photographic sensitometry)

CHERNYY, I.A.

Third International Congress on High-Speed Photography. Usp.nauch. fot. 6:221 '59. (MIRA 13:6)
(Photography, High-speed--Congresses)

25(3) SOV/77-4-4-16/19

AUTHOR: Chernyy, I.A.

TITLE: About International Standardization of Numerical Expression of the Sensitivity of Negative Black and White Photographic Materials

PERIODICAL: Zhurnal nauchnoy i prikladnoy fotografii i kinematografii, 1959, Vol 4, Nr 4, pp 313-316 (USSR)

ABSTRACT: The author gives a report on the negotiations at the last session of International Standardization Organization in Harrowgate. The international standardization of the sensitivity of photographic materials was discussed. The author describes the standards GOST 2817-50, DIN 4512 -1957, ASA RN-2-5-1954 and R-6. There are 4 references, 1 of which is Soviet, 2 English and 1 German.

Card 1/1

CHERNYY, I.A.

International standardization of sensitometry. Zhur.nauch.i prikl. fot.i kin. 5 no.2:158-159 Mr-Ap '60. (MIRA 14:5)
(Photographic sensitometry--Standards)

KORNDORF, V.A.; CHERNYY, I.A.

High-resolving power photographic plates produced by the All-Union Scientific Research Institute of Meteorology for purposes of instrumentation. Trudy Inst.Kom.stand., mer i izm.prib. no.56:124-127 '61. (MIRA 15:12)
(Photography--Plates)
(Photographic sensitometry)

CHERNYY, I.A.

International congresses on high-speed photography. Zhur. nauch.i prikl.fot. i kin. 6 no.5:395 S-O '61. (MIRA 14:9)
(Photography, High speed--Congresses)

KORNDORF, V.A.; CHERNYY, I.A.

Selecting apertures and type of lenses of apparatus for measuring the resolving power of photographic materials. Zhur.nauch.i prikl. fot.i kin. 6 no.6:454-456 N-D '61. (MIRA 15:1)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut metrologii imeni D.I. Mendeleyeva.
(Photographic sensitometry)
(Photographic emulsions--Tesing)

S/081/62/000/013/035/054
B156/B101

AUTHORS: Korndorf, V. A., Chernyy, I. A.

TITLE: The VNIIM high resolving power photographic plates for control and measurement

PERIODICAL: Referativnyy zhurnal. Khimiya, no. 13, 1962, 503, abstract 13L499 (Tr. in-tov Kom-ta standartov, mer i izmerit. priborov pri Sov. Min. SSSR, no. 56 (116), 1961, 124-127)

TEXT: A method of preparing photographic plates with a resolving power of >1000 lines per mm and a contrast factor of ~5.0 is described. After optical sensitization, the light sensitivity of the plates is ~200-300·10^{-6} ГОСТ (GOST) units. [Abstracter's note: Complete translation.]

Card 1/1

KORNDORF, V.A.; CHERNYY, I.A.

Resolving power of some black-white and color photographic materials as a function of the lens aperture. Trudy Inst.Kom. stand., mer i izm.prib. no.56:118-123 '61. (MIRA 15:12)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut metrologii im. D.I.Mendeleyeva.
(Photography--Apparatus and supplies)

KORNDORF, V.A.; CHERNYY, I.A.

Limit resolving power of the system lens - photographic layer.
Zhur.nauch. i prikl.fot. i kin. 9 no.6:448-451 N-D '64.
(MIRA 18:1)

1. Vsesoyuznyy nauchno-issledovatel'skiy institut metrologii imeni D.I.Mendeleyeva, Leningrad.

1. CHERNYY, I. A.

2. USSR (600)

4. Electric Cables

7. Determining damage in a cable network with a high voltage cable bridge. Rab. energ. 2 no. 11, 1952.

9. Monthly List of Russian Accessions, Library of Congress, March 1953. Unclassified.

CHERNYY, I. A.

"Determining Losses of Idle Transformers Under Factory Conditions," Energ. Byul., No.4, 1952

CHERNYY, I. A.

"Protecting Circuits of Electric Meters During the Testing of Electric Equipment," Energ. Byul., No.5, 1952

1. BOYARKO, Ye. A.; CHERNYY, I. A.

2. USSR (600)

4. Selenium Cells

7. Basic properties of selenium cells, Energ. biul., No. 9, 1952.

9. Monthly List of Russian Accessions, Library of Congress, February 1953. Unclassified.

1. BOIARKO, E. A.: CHERNYY, I. A.

2. USSR (600)

4. Electric Current Rectifiers

7. Scheme for transforming an alternating current into a direct current. Energ. biul. no. 11, 1952.

9. Monthly List of Russian Accessions, Library of Congress, March 1953. Unclassified.

1. BOYARKO, YE. A.: CHERNYY, I. A.

2. USSR (600)

4. Electric Current Rectifiers

7. Capital repairs of the rectifiers of oil and selenium units. Energ.biul., no. 12, 1952.

9. Monthly List of Russian Accessions, Library of Congress, April 1953, Uncl.

CHERNYY, I. A.

AID P - 796

Subject : USSR/Electricity

Card 1/1 Pub. 28 - 6/11

Author : Chernyy, I. A.

Title : Lowering of no-load current of the motors as means for reduction of consumption of the reaction power in the industrial enterprises

Periodical : Energ. byul., #7, 23-25, Jl 1954

Abstract : The power consumed by the no-load induction motor is considered as a large part of the reactive power and can be computed with the formulas presented or taken from a chart. Motors with large no-load current can be substituted for by smaller motors on the basis of the computation. One chart and 2 Russian references.

Institution : None

Submitted : No date

CHERNYY, I. A.

AID P - 979

Subject : USSR/Engineering

Card 1/1 Pub. 28 - 2/9

Author : Chernyy, I. A.

Title : Adjustment of electric drive of rotory counterbalance pump mechanisms to mechanical characteristics of induction motors

Periodical : Energ. byul., #10, 9-15, O 1954

Abstract : Analytical computation of static and dynamic loads is presented for the linear and parabolic portion of mechanical characteristics of the induction motors with the purpose of ensuring minimum error. The use of the adopted approximation for normal induction motors gave excessive errors. Therefore, motor characteristics should be considered in detail in relation to the pump mechanism characteristics. Three charts, 1 table and 6 Russian references (1948-54).

Institution : None

Submitted : No date

CHERNYY, I. A.

AID P - 2368

Subject : USSR/Electricity

Card 1/1 Pub. 28 - 2/13

Author : Chernyy, I. A.

Title : Basic data on high torque and high slip motors used to operate walking beams

Periodical : Energ. Byul., 6, 4-8, Je 1955

Abstract : The author presents data and a comprehensive analysis of the operation of the AOP and the AOS totally-enclosed, fan-cooled high torque and high slip motors which are used in the petroleum industry to operate walking beams.
Two tables and 7 diagrams of the basic data and pertinent characteristics of the AOP motor (19 types from 1.7 to 55.0 kilowatts) and the AOS motor (20 types from 1.7 to 55.0 kw) are included.

Institution: None

Submitted : No date

CHERNYI, I.A.

CHERNYI, I.A.; SYACHIN, N.I.

Electric equipment for salt removal apparatus used in petroleum refineries. Energ.biul. no.12: 8-12 D '57 (MIRA 10:12)
(Petroleum--Refining)

CHERNYY, I.A., inzh.

About the term "zeroing." Prom. energ. 14 no.1:61 Ja '59.
(MIRA 12:1)

1.Gosudarstvennyy proyektnyy institut "Elektroproyekt."
(Electric engineering--Terminology)

CHERNYY, I.A.

Protective groundings in units with objects exposed to explosions.
Prom.energ. 14 no.2:31-33 F '59. (MIRA 12:3)

1. Gosudarstvennyy proyektnyy institut "Elektroproyekt."
(Electric currents--Grounding) (Industrial safety)

CHERNYY, I.A.

Use of a voltmeter for measuring the resistance of system ground circuits. Prom. energ. 15 no.11:39-41 N '60. (MIRA 14:9)
(Electric measurements)

CHERNYY, I.A., inzh.

Determination of cable damages in water using a high-voltage cable bridge. Prom. energ. 17 no.12:21-23 D '62. (MIRA 17:4)

CHERNYY, I.A., inzh.

Measurement of the electrical resistance of protective equipment ground circuits. Prom.energ. 18 no.2:16-18 F '63. (MIRA 16:2)

(Electric power distribution)

KORNDORF, V.A.; CHERNYY, I.A.

Standardization of the measurement of the resolving power. Usp.nauch.fot. 10:90-93 '64. (MIRA 17:10)

CHERNYY, I.A., inzh.

Determination of the expediency of the replacement of nonloaded asynchronous motors. Prom.energ. 19 no.7:10-14 Jl '64.
(MIRA 18:1)

Anomalous Azbel-Kaner resonance effect in lead telluride.
A. Kobayasi (20 minutes).

Chemico-analytical methods of determination of micro-impurities in doped monocrystals of the type $A^{II}B^{VI}$. I. B. Mizetskaya, L. M. Kalashnik, O. P. Kulik, I. G. Chernyy.

Doping of cubic monocrystals of CdS in the process of their growth and some physical characteristics of the resulting samples.
N. I. Vitrikhovskiy, I. B. Mizetskaya.

Report presented at the 3rd National Conference on Semiconductor Compounds, Kishinev, 16-21 Sept 1963

L 29915-66 JXT(BF)

ACC NR: AP6006591 SOURCE CODE: UR/0315/65/000/009/0028/0031

24
B

AUTHOR: Chernyy, A. I., Chernyy, I. I.

ORG: none

TITLE: Equipment for information retrieval systems using peek-a-boo punched cards

SOURCE: Nauchno-tekhnicheskaya informatsiya, no. 9, 1965, 28-31

TOPIC TAGS: information storage and retrieval, computer input unit, punched card

ABSTRACT: Equipment is described suitable for setting up information retrieval systems based on peek-a-boo punched cards. The equipment consists of a bank of cards (capacity 9000 documents per card), an electrically powered card punch, and a peek-a-boo viewer. The cards measure 282 × 253 mm and have a grid system for 100 × 90 perforations. The card, perforator and viewer are described and shown in photographs. The equipment was developed in the Scientific Methods Division of VINITI. Orig. art. has: 7 figures.

SUB CODE: 05/ SUBM DATE: 30Jul65/ OTH REF: 003

UDC: [002.513.5:676.815.2].002.5

Card 1/1

SHINKORENKO, S.F., kand.tekhn.nauk; LIBEFORT, Yu.I., inzh.; KRUTIY, V.V., inzh.; CHERNYY, I.I., inzh.; TSYURYUPA, A.D., inzh.; GRAZHDANTSEV, I.I.

Setting up departments of secondary treatment in ore dressing plants of the Nikopol'-Marganets Trust. Gor.zhur. no.4:68-71 Ap '64. (MIRA 17:4)

1. Mekhanobrchermet (for Shinkorenko, Libefort, Krutiy, Chernyy, Tsyuryupa). 2. Trest Nikopol'-Marganets (for Grazhdantsev).

CHERNYY, A.I.; CHERNYY, I.I.

Assembly of equipment for documentary information retrieval systems on superimposed punched cards. NTI no.9:28-31 '65.

CHERNYY, Ivan Ivanovich; PONOMAREV, I.K., retsenzent;

[Grizzly operator] Mashinist grokhotov. Moskva, Izd-vo "Nedra," 1964. 93 p. (MIRA 17:6)

LIEFFORT, Yu.I.; CHERNYY, I.I.

Selection of the best equipment for crushing low-grade manganese concentrates of ore dressing plants. Met. i gornorud. prom. no.5:54-55 S-O '64. (MIRA 18:7)

L 55212-65

ACCESSION NR: AP5015253 UR/0286/65/000/009/0035/0035

4
B

AUTHOR: Chernyy, I. I.

TITLE: Two-channel dc voltage multiplier. Class 21, No. 170555

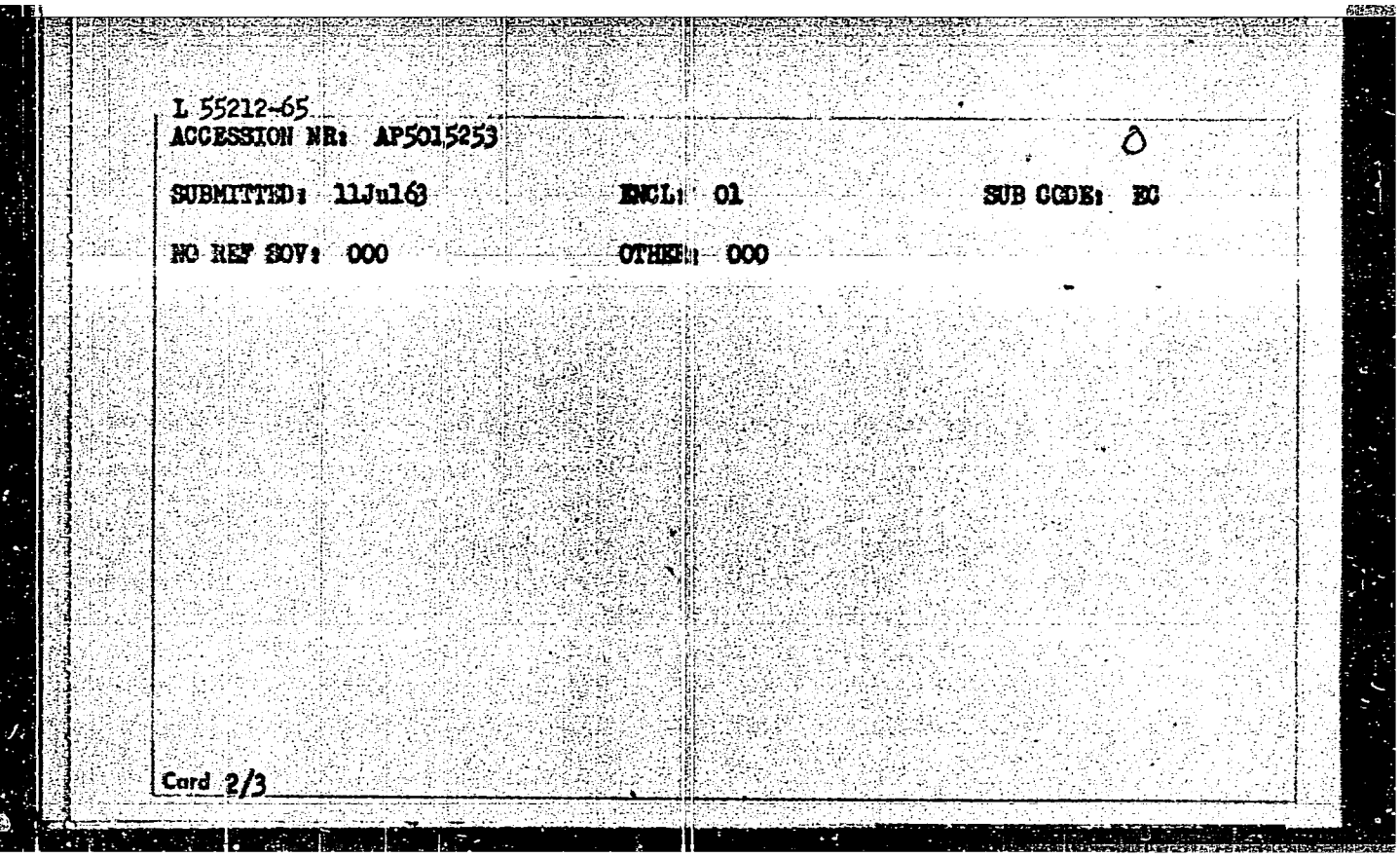
SOURCE: Byulleten' izobreteniy i tovarnykh znakov, no. 9, 1965, 35

TOPIC TAGS: voltage amplifier, transistorized circuit

ABSTRACT: This Author Certificate presents a two-channel dc voltage multiplier containing rectifiers and switches and made of semiconductor devices. For voltage multiplication, one or several bridge rectifier circuits with capacitive storage are connected in series with a power supply through a two-channel switch. The switch provides periodic polarity change of the voltage supplied to the circuit (see Fig. 1 on the Enclosure). To obtain simultaneously voltages of different polarity, the rectifier bridges are connected in series with the different poles of the power supply and are connected through capacitors to the same switch. Orig. art. has: 1 diagram.

ASSOCIATION: none

Card 1/3



L 55212-65
ACCESSION NR: AP5015253

SUBMITTED: 11Jul63 ENCL: 01 SUB CODE: EC

NO REF SOV: 000 OTHER: 000

Card 2/3

L 55212-65
ACCESSION NR: AP5015253

ENCLOSURE: 01

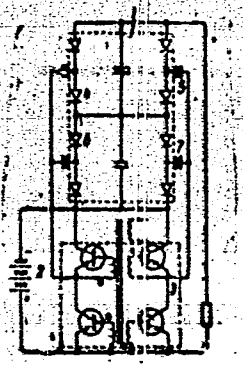


Fig. 1

1- two bridge rectifier circuits; 2- power supply;
3- switch; 4-7- capacitors

Card 3/3

CHERNYY, I. L.

Chernyy, I. L. - "The role of peat in the national economy of the Belorussian SSR," In symposium: Torf v nar. khoz-ve Belorus. SSR, Minsk, 1948, p. 10-24

So: U-3566, 15 March 53, (Letopis 'Zhurnal 'nykh Statey, No. 13, 1949)

CHERNYY, I.L. (Minsk); BEREZOVSKIY, V.I. (Minsk)

Advantage of kilning lime in rotary kilns. Stroi. mat. 9 no.6:9 Je '63. (MIRA 17:8)

CHERNYY, I.L.; GALUZO, G.S.; IZRAYELIT, M.M.

Strength and deformation of lime concrete with agloporite filler.
Stroi.mat. 10 no.12:21-23 D '64.
(MIRA 18:1)

DRAGENBERG, A.Kh.; CHERNYY, I.M.

Device for lowering pipes into shafts. Sbor. rats. predl. vnedr. v proizv. no.2:10 '61. (MIRA 14:7)

1. Rudoupravleniye imeni Dzerzhinskogo, shakhta "Gigant". (Mining engineering)

L 24551-66 -EWT(1)/EWA(h)

ACC NR: AP6006319 SOURCE CODE: UR/0413/66/000/002/0040/0040

AUTHOR: Chernyy, I. I.

ORG: none

TITLE: An alternating current amplifier. Class 21, No. 177931

SOURCE: Izobreteniya, promyshlennyye obraztsy, tovarnyye znaki, no. 2, 1966, 40

TOPIC TAGS: alternating current, electronic circuit, transistorized amplifier

ABSTRACT: This Author Certificate presents an alternating current transistorized amplifier. The transistors are connected in series on the basis of the direct current, and are connected in parallel on the basis of the alternating current. The load is connected to the generator with a transformerless connection. The design reduces the output resistance of the amplifier. Each pair of transistors connected in series on the basis of the direct current is shunted by a capacitor (see Fig. 1). The load resistance is connected through capacitors to the points where the transistors of each pair are connected together. The load resistance is also connected to one of the poles of the amplifier power supply source.

Card 1/2

UDC: 621.375.4

L 24551-66
ACC NR: AP6006319

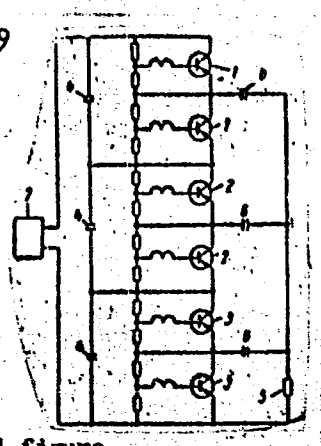


Fig. 1. 1 to 3 - pairs of transistors; 4 - shunting capacitors; 5 - load resistance; 6 - capacitors in the circuit; 7 - power supply source.

Orig. art. has: 1 figure.

SUB CODE: 09/ SUBM DATE: 21Dec62

Card 2/2

CHERNYY, I.M. [Chornyi, I.M.]; YANKOVSKIY, L.G. [IAnkovs'kyi, L.H.]

Experimental investigation of the work of a water-jet propeller. Visti Inst. gidrol. i gidr. AN URSR 17:59-65 '60. (MIRA 14:8)

(Propellers)

CHERNYY, I.M. [Chornyi, I.M.]

Interaction of the water-jet propeller with a ship hull. Visti Inst. hidrol. i hidr. AN URSR 19:103-116 '61. (MIRA 15:7)
(Propellers) (Hydraulics)

ACCESSION NR: AT4028735 S/3083/63/022/000/0069/0080

AUTHOR: Chorny*y, I. M. (Cherny*y, I. M.)

TITLE: The effect of the shape of the through-flow channel of a hydrojet engine on the design parameters of the power plant complex

SOURCE: AN UkrRSR. Insty*tut gidrologiyi i gidrotekhniky*. Visti, v. 22(29), 1963. Gidromekhanika sudna (Ship hydromechanics), 69-80

TOPIC TAGS: hydrojet, hydrojet engine, through-flow channel, ship hull, hull engine interaction, water transport, hydrojet intake coefficient

ABSTRACT: Experiments were conducted to determine the interaction coefficients between the hull and the engine, the velocity in the propeller plane and the losses in the through-flow channel of a hydrojet engine. A twin shaft, large scale boat model was used in the experiments. The data was obtained for various forms of the intake channel, shown in Figure 1 of the Enclosure. These experimental results were required in order to improve the effectiveness of the "equivalent propeller" design method for hydrojet engines as developed by the Leningradskiy Institut Vodnogo Transporta (Leningrad Institute of River Transport) and described by Basin and Medvedev (Rechnoy Transport, No. 11, 1959). It was established that in order to be able to use the LIVT design method, the intake

Card 1/3

ACCESSION NR: AT4028735

coefficient $t = -(P-P_e)/P$ (P_e and P = vehicle thrust and propeller thrust block, respectively), and the normalized flow velocity, v_s, in the propeller plane must be evaluated experimentally, taking into account the physical shape of the intake channel. The results enable an estimate of these parameters to be made for various values of the normalized longitudinal dimension of the intake channel orifice (l_k/D from 3.9 to 11.4) as shown in Figure 1a. The increase of l_k/D in this case improves the propulsion properties of the complex due to a decrease in the intake loss. The form of intake channel shown in Figure 1a can be used for high speed channel and river vessels. Tug-boats require an increase in transverse orifice dimension. A correction scheme is introduced to enable a more accurate computation of the intake coefficient during partial submersion of the propeller. The experimental curves also enable evaluation of the output jet tube parameters as a function of the form of the input channel. The data is presented in the form of normalized design curves. Orig. art. has: 9 figures and 21 equations.

ASSOCIATION: Insty*tut gidrologiyi i gidrotekhniky* AN UkrR/SR (Institute of Hydrology and Hydrotechnology, AN UkrSSR)

SUBMITTED: 00 DATE ACQ: 16Apr64 ENCL: 01

SUB CODE: PR, ME NO REF SOV: 008 OTHER: 000

Card 2/3

ENCLOSURE:01

ACCESSION NR: AT4028735

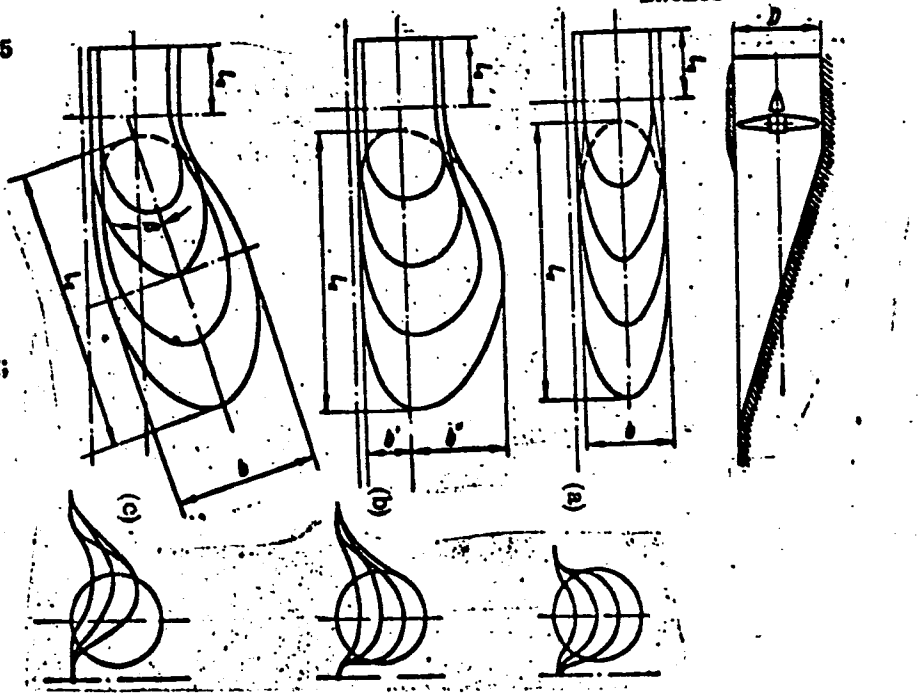


Fig. 1. Possible forms of the intake portion of the through-flow channel of a hydro-jet engine with a bottom intake.
a - direct intake without transverse opening;
b - direct intake with nonsymmetrical opening;
c - indirect intake.

Card 3/3

KOR DORF, V.A.; CHERNYY, I.N.

Instrument for controlling the color temperature of incandescent lamps. Trudy VNIIM no.26:85-91 '55. (MIRA 11:6)
(Photographic sensitometry)

A-U Sci. Res. Inst. Metrology

SOV/65-59-4-13/14

AUTHOR: Chernyy, I.R.

TITLE: Reply to P.S.Kutyumov on "Lay-out of Gas-Separating Plants in Petroleum Refineries" (Otvet P.S.Kutyumovu)

PERIODICAL: Khimiya i tekhnologiya topliv i masel, 1959, Nr 4, pp 67-68 (USSR)

ABSTRACT: The author points out various drawbacks in P.A.Smirnov's original publication and in the modifications suggested by P.S.Kutyumov.

Card 1/1

VOL'-EPSHTEYN, A.B.; ZAMANOV, V.V.; KRICHKO, A.A.; TITOVA, T.A.; CHERNYY, I.R.

Obtaining benzene by the hydrogenation of the products of fuel pyrolysis. Khim. prom. 41 no.5:325-329 My '65.

(MIRA 18:6)

CHERNYY, I.S., inzh.

Make more effective use of new traffic techniques. Zhel. dor. transp. 41 no.1:65-67 Ja '59. (MIRA 12:1)
(Railroads--Traffic) (Railroads--Signaling)

KOZLOV, Vasiliy Yefimovich; CHERNYY, I.S., inzh., red.; KHITROV, P.A., tekhn.red.

[Efficiency of dispatcher centralization on single-track and double-track lines] Effektivnost' dispetcherskoi tsentralizatsii na odnoputnykh i dvukhputnykh liniiakh. Moskva, Gos.transp.zheldor.izd-vo, 1959. 150 p. (Vsesoiuznyi nauchno-issledovatel'skii institut zheleznodorozhnogo transporta. Trudy no.167)
(MIRA 12:5)

(Railroads--Train dispatching)

SHKVARNIKOV, P.K.; CHERNYY, I.V.

Experimental mutations in spring wheat and their significance for breeding. Report No.2. Radiobiologiia 1 no.5:799-806 '61.
(MIRA 14:11)

1. Institut tsitologii i genetiki Sibirskogo otdeleniya AN SSSR, Novosibirsk.
(WHEAT BREEDING) (PLANTS, EFFECT OF RADIATION ON)

SHKVARNIKOV, P.K.; CHERNYY, I.V.

Experimental mutations in spring wheat and their breeding significance. Radiobiologiia 1 no.2:296-303 '61. (MIRA 14:7)

1. Institut tsitologii i genetiki Sibirskogo otdeleniya AN SSSR, Novosibirsk.

(PLANTS, EFFECT OF RADIATION ON)
(WHEAT BREEDING)

SHKVARNIKOV, P.K.; CHERNYY, I.V.

Characteristics of radiation-induced mutations in spring wheat as related to the type of radiation applied. Nov. Sib. otd. AN SSSR no.10:100-110 '62 (MIRA 17:8)

1. Institut tsitologii i genetiki Sibirskogo otdeleniya AN SSSR, Novosibirsk.

ACCESSION NR: AP4027984 S/0205/64/004/002/0297/0305

AUTHOR: Shkvarnikov, P. K.; Chernyy, I. V.

TITLE: Influence of storage temperature and oxygen tension on the radiobiological effects of seeds

SOURCE: Radiobiologiya, v. 4, no. 2, 1964, 297-305

TOPIC TAGS: ionizing radiation, Mil'turum 553 wheat, gamma-irradiated seed, thermal neutron irradiated seed, storage temperature (40°C), storage oxygen level (60%), mutation frequency, mutation spectrum change

ABSTRACT: Air dried Mil'turum 553 wheat seeds were treated with various doses of gamma or thermal neutron irradiation and stored under different conditions. One group of irradiated seeds was stored for 30 days at room temperature, a second group was stored at 40°C, and a third group was stored in a 60% oxygen concentration at room temperature. All seeds were planted in a hot house and transplanted to a field when two or three leaves appeared. The second generation seeds were planted directly in a field. Germination and viability were

Card 1/3

ACCESSION NR: AP4027984

indices for the first generation. In the second generation morphological and physiological changes were studied during the entire vegetative period and checked in following generations. Findings show that temperature and oxygen level during storage period of seeds, treated with gamma- or thermal neutron radiation, significantly modify their radiation effects. The mutagenic effects of gamma-irradiated seeds are more affected by storage at 40°C or in 60% oxygen than thermal neutron irradiated seeds. Storage at 40°C decreases the mutation frequency of gamma-irradiated seeds and changes their mutation spectrum by a 12% decrease in number of general types and a 14% increase of new mutation types. However, storage at 40°C significantly increases the mutation frequency of thermal neutron treated seeds, but produces fewer specific mutations (5.8%). The mutation frequency of gamma-irradiated seeds, stored in 60% oxygen, increases and the mutation spectrum changes the same as with increased temperature (40°). However, the mutation frequency of thermal neutron treated seeds, stored in 60% oxygen, decreases and the mutation spectrum changes with a decrease in number of general types and a higher number of specific type mutations than for 40°C. The modifying action of storage conditions on the genetic effects of radiation appears to be based on

Card 2/3

ACCESSION NR: AP4027984

the interaction of chemical substances forming and accumulating in the seeds as a result of radiation and other external factors. Orig. art. has: 4 tables and 2 figures.

ASSOCIATION: Institut tsitologii i genetiki SO AN SSSR, Novosibirsk (Cytology and Genetics Institute SO AN SSSR)

SUBMITTED: 13Sep62 ENCL: 00

SUB CODE: LS NR REF SOV: 008 OTHER: 005

Cord 3/3

CHERNYY, I.V.

Effect of gamma rays on the content and quality of gluten in spring wheat. Radiobiologiia 5 no.4:602-604 '65.
(MIRA 18:9)

1. Institut tsitologii i genetiki Sibirskogo otdeleniya AN SSSR, Novosibirsk.

CHERNYY, L.

621.316.57.064.45

3369. DRYING OF COMPRESSED AIR FOR HIGH-VOLTAGE CIRCUIT BREAKERS. V.Gusa. I.Krzhizh. I.Ladcar and [illegible]

Elekt. Sbornik, 1956, No. 2, 20-31. In Russian.

The reduction of the relative humidity through expansion from 30 kg/cm² to 15 kg/cm² is not sufficient if the plant has [illegible] temperatures of -20°C. Additional [illegible] through silica-gel filters and an arrangement is described by which two filters work alternately and are automatically taken out of service and dried when their moisture content has reached a certain value as indicated by the fall in electrical resistivity of a silica-gel indicator. Drying of the filter then takes place through passing of hot air. When the filter is dry enough, the heater and the air circulation are automatically switched off.

F.Busemann

Nauchno-issledovatel'skiy Inst. Sil'notochnoy elektrotekhniki

Czechoslovakia

CHERNYY, L.

Category : USSR/Electronics - Gas Discharge and Gas-Discharge Instruments H-7

Abs Jour : Ref Zhur - Fizika, No 1, 1957, No 1721

Author : Tsigelka, I., Chernyy, L., Gusa, V., Krzhizh, I., Ladnar, I.
Title : Mechanics of Arc Discharge at High Pressure in the Stream of an Air Circuit Breaker

Orig Pub : Zh. tekhn. fiziki, 1956, 26, No 3, 499-504

Abstract : No abstract

Card : 1/1

621.316.57.064.45

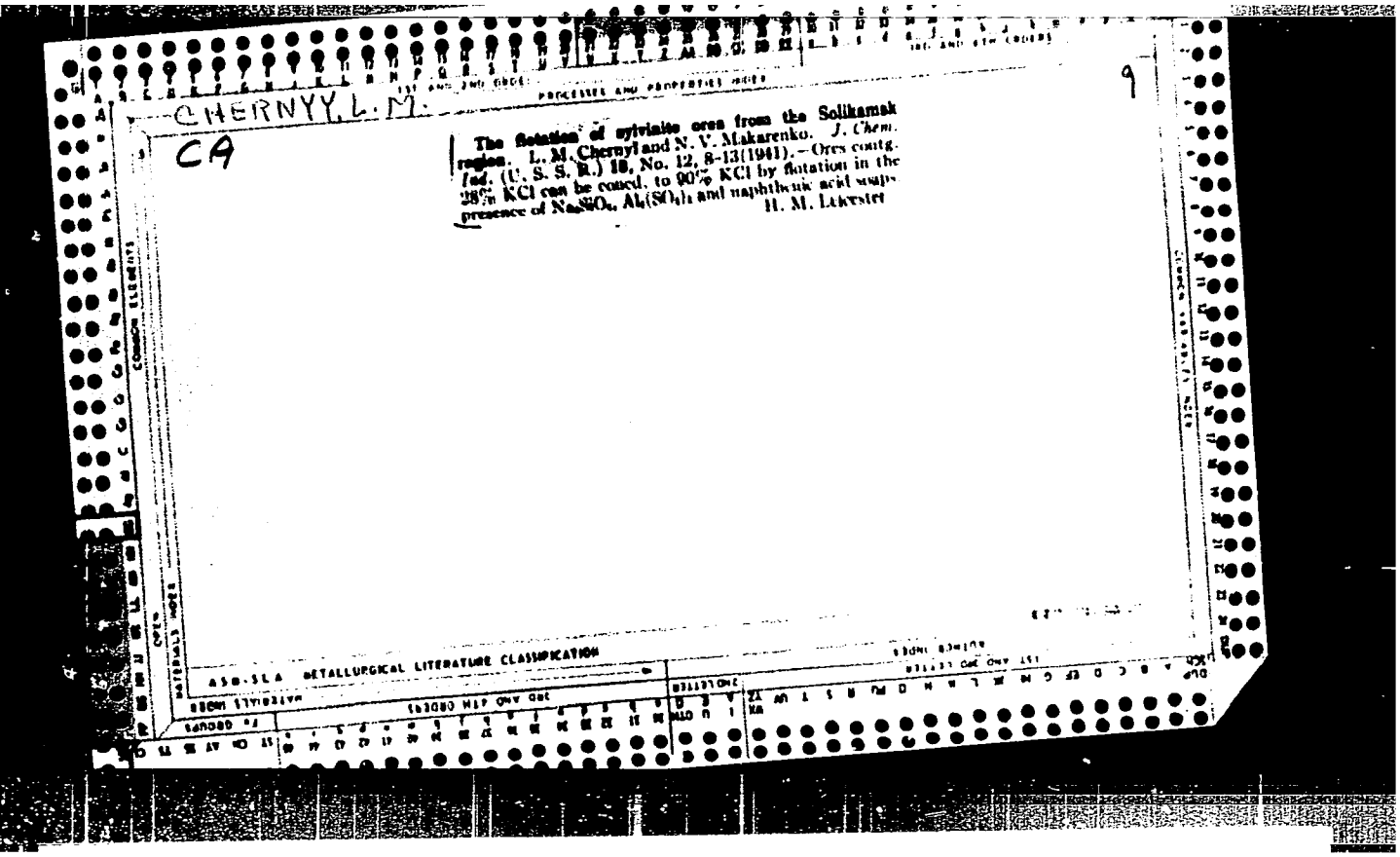
115. **THE MECHANISM OF AN ARC DISCHARGE AT HIGH PRESSURE IN THE NOZZLE OF AN AIR-BLAST CIRCUIT-BREAKER** I.Tsigeika, L.Cherugl, V.Ousa, I.Krthiah and I.Ladnar

Zh. tekh. Fiz., Vol. 26, No. 3, 499-504 (1956) In Russian

A series of experiments was made with an air-blast circuit-breaker having a brass Laval nozzle. Air at 4 atm pressure was used to extinguish the arc, there was also a [illegible] coil providing a magnetic field. The separation of the contacts was synchronised. So that experiments could be repeated without difficulty, the experiments were performed with a [illegible] of 500 A at 40 [illegible]. The arc duration was of the order of [illegible] sec. The arc traces were noted both with the nozzle as anode and as cathode. It was concluded that electrical conductivity at the nozzle is due to electrons and that intense ionization extends to a distance of several mm from the cathode. Anions from here knock electrons out of the cathode and maintain conditions in the anode-cathode space. Near the anode the velocity of the electrons (due to the electric field) is affected by the air stream. It was found impossible to prevent simple [illegible] of the [illegible] stream of an arc discharge. An [illegible] [illegible] of [illegible] brings about rapid changes [illegible] [illegible] amplitude which set up voltage [illegible] when the arc is burning.

C.R.S.M[illegible]

5

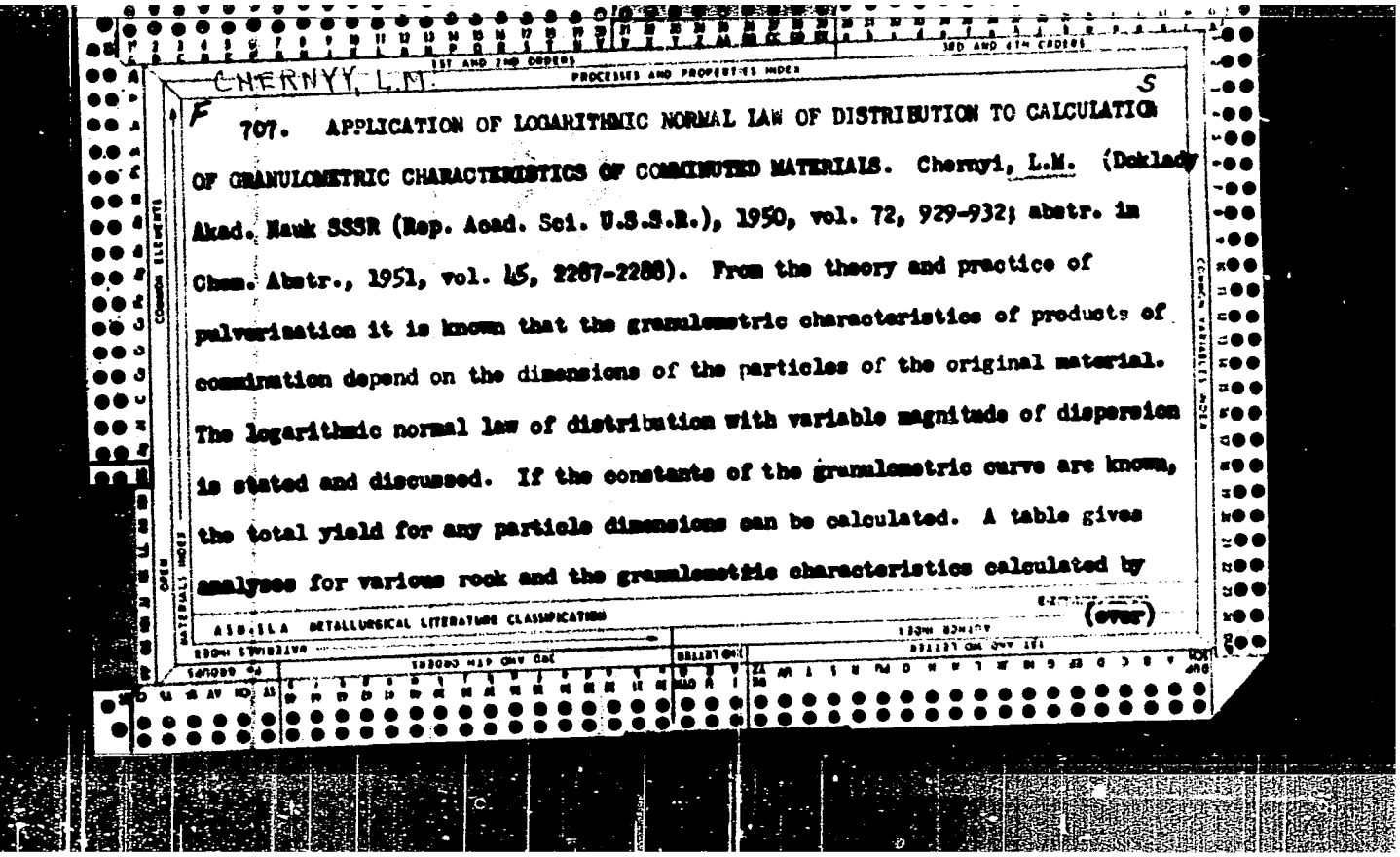


CHERNYY, L. M.

CA

9

The flotation of sylvinite ores from the Solikamsk region. L. M. Chernyi and N. V. Makarenko. *J. Chem. Ind.* (U. S. S. R.) 18, No. 12, 8-13(1941).—Ores contg. 28% KCl can be concd. to 90% KCl by flotation in the presence of Na_2SO_4, $Al_2(SO_4)_3$ and naphthenic acid soaps. H. M. Lukester



CHERNYY, L.M.

S

F 707. APPLICATION OF LOGARITHMIC NORMAL LAW OF DISTRIBUTION TO CALCULATION OF GRANULOMETRIC CHARACTERISTICS OF COMMINUTED MATERIALS. Chernyi, L.M. (Doklady Akad. Nauk SSSR (Rep. Acad. Sci. U.S.S.R.), 1950, vol. 72, 929-932; abstr. in Chem. Abstr., 1951, vol. 45, 2287-2288). From the theory and practice of pulverization it is known that the granulometric characteristics of products of comminution depend on the dimensions of the particles of the original material. The logarithmic normal law of distribution with variable magnitude of dispersion is stated and discussed. If the constants of the granulometric curve are known, the total yield for any particle dimensions can be calculated. A table gives analyses for various rock and the granulometric characteristics calculated by

(over)

various formulae. The most exact formula is that with variable magnitude of dispersion, which is based on the logarithmic normal law of distribution of particles during pulverization.

C.A.

CHERNYI, L.M.

3
4E2c

Beneficiation of the Bug River Basin sandy phosphorite ore. L. M. Chernyi. *Khim. Prom.* 1957, 89-0.—The average P_2O_5 content of the sand is 11%, with 58 [illegible] material. Of the several [illegible] washing the ore and a separate [illegible] concentrates with [illegible] flotation [illegible] tion of the washing residues [illegible] gave the best results. The concentrate contained P_2O_5 [illegible] recovery. [illegible] [illegible] the [illegible] [illegible]

CHERNYY, L.M.

Action mechanism of some inorganic acids during flotation in the acid medium of phosphate-dolomite ores. Khim. prom. no.5:341-344 My '63. (MIRA 16:8)

NAPADOV, M.A., kand.med.nauk; CHERNYY, L.Ya., klinicheskiy ordinator

Therapeutic splints of quick-setting plastic for the fixation of loose teeth in paradentosis. Stomatologiia 41 no.5:79-80 S-O '62. (MIRA 16:4)

1. Iz kafedry stomatologii (zav. - dotsent S.Z.Gutkin) Ukrainskogo instituta usovershenstvovaniya vrachey (nauchnyy rukovoditel' raboty A.E.Rofe).
(DENTISTRY, OPERATIVE) (PLASTICS IN MEDICINE)
(GUMS—DISEASES)

CHERNYY, M.A.

OLEYNIKOV, F.G.; CHERNYY, M.A.

Stamping attachment for the labeling machine produced by the Odessa machine manufacturing plant. Kons.i ov.prom. 12 no.9:23-24 S '57. (MLRA 10:10)

1. Rostovskiy konservnyy zavod "Smychka."
(Labeling machines)